

Amendments to the Claims

The following Listing of Claims replaces all prior versions and listings of claims in the application.

Listing of Claims

1 – 10 (cancelled)

11. (currently amended) A device for removing proteases from biological fluids and pharmaceutical solutions comprising a housing having a fluid inlet and a fluid outlet, said housing containing a plurality of membranes arranged therein in series, wherein said membranes each consist essentially of a functionalized microporous membrane body containing functional groups ~~capable of chemically coupling with protease inhibitors and~~ chemically coupled to at least one protease inhibitor that is capable of selectively binding a protease selected from the group consisting of an acidic protease, a metalloprotease, a cysteine protease and a serine protease, said serine protease inhibitor being selected from the group consisting of TLCK and p-aminobenzamidine.

12. (cancelled)

13. (previously presented) The device of claim 11 wherein said protease inhibitor capable of binding with an acidic protease is pepstatin; said protease inhibitor capable of binding with a metalloprotease is selected from the group consisting of bestatin, diprotin and

EDTA; and said protease inhibitor capable of binding with a cysteine protease is selected from the group consisting of antipain, chymostatin, leupeptin and E64.

14. (previously presented) The device of claim 11 wherein said membranes each contain two different protease inhibitors.

15. (currently amended) A method for removing proteases from fluids comprising feeding a protease-containing fluid to the device of any of claims 11, 13[,] or 14 ~~or~~ 16.

16. (previously presented) The device of claim 11 wherein said protease inhibitor capable of binding with a serine protease is selected from the group consisting of TLCK and p-aminobenzamidinium and said functional groups are epoxy groups.